

EMPTYING TANKS OR CONTAINERS

When product tanks, totes, other containers, or equipment containing liquids or residues are taken out of service for maintenance, repair or permanent closure, a facility needs to determine if the materials removed from them are a product or a waste, and determine if there has been a release. If the removed material is a waste, then it is necessary to determine if the material is regulated as used oil, liquid industrial waste, hazardous waste, or solid waste to know which waste management regulations must be followed. See the [Waste Characterization](#) guidance for more information.

If the materials are removed from regulated [aboveground](#) or [underground storage tanks](#), there are additional tank regulations that must be met that are not covered in this guidance. For basic product tank information, see the following guidance:

- *Underground Storage Tank Overview* at www.michigan.gov/documents/deq/deq-ess-USTprooverview_210843_7.pdf
- *Aboveground Storage Tank Program An Overview* at www.deq.state.mi.us/documents/deq-ead-tas-astbroch.pdf

Discuss your specific regulated tank requirements with the local [district office](#) hazardous material storage tank inspector.

If tanks or containers being emptied held hazardous waste, there are additional hazardous waste requirements not covered in this guidance. The specific requirements are based on if the hazardous waste was a liquid or not, when the tanks were installed, and whether the waste was at a generator's site or at a treatment, storage, and treatment facility (TSDF). At closure of a tank system or accumulation area, the owner or operator must remove or decontaminate all waste residues, contaminated containment system components (liners, etc.), contaminated soils, and structures and equipment contaminated with waste, and manage them as hazardous waste unless it meets a condition listed in 40 CFR 261.3(d).

For more information and references to the applicable hazardous waste regulations, see the tank portion in the U.S. Environmental Protection Agency (EPA) guidance [Hazardous Waste Generator Regulations](#) and the applicable sections on the [inspection checklists](#) for closing hazardous waste tanks and accumulation areas. Select the appropriate checklist based on the facility's generator status. Discuss your specific hazardous waste tank questions with the local [district office](#) hazardous waste inspector.

IDENTIFIED OR SUSPECTED RELEASES

If a leak or release from a product tank or container is confirmed or there is suspected or known contamination, a facility must meet the applicable release reporting requirements. If the leak has created an emergency situation or if in doubt whether it is a reportable release, call:

- 911 and
- Pollution Emergency Alerting System (PEAS) at 800-292-4706 (or dial 517-373-7660 if calling outside of Michigan) and
- National Response Center at 800-424-8802

A summary table of release reporting regulations and other resources is at www.michigan.gov/degrelease. If the facility was required to prepare an [emergency plan](#), the facility's release reporting information should be in that plan.

Depending on the situation and tank or container contents, the cleanup may be overseen by the Waste and Hazardous Materials Division (WHMD) under [Part 111, Hazardous Waste Management, of Act 451 of 1994 as amended \(Act 451\)](#), or by the Remediation and Redevelopment Division (RRD) under [Part 201 for aboveground storage tanks \(AST\) or containers, or Part 213 of Act 451 for underground storage tanks \(UST\)](#). Contact the [district office](#) to discuss your cleanup requirements. Once contamination from [leaking underground storage tanks \(LUST\)](#) is documented with RRD, the owner/operator needs to be aware that the LUST program has strict reporting requirements. The requirements include reports that must be submitted within 30 days and 365 days from the date of the release and the final closure report. The program requires the use of a [Qualified Underground Storage Tank Consultant \(QC\)](#). The QC list is located on the DEQ webpage at www.michigan.gov/deq; click 'Online Services' at the top under the DEQ title, then 'Storage Tank Information Center' in the list, and then the QC tab.

MANAGING MATERIAL REMOVED FROM TANK SYSTEMS AND CONTAINERS

Regarding the removed material:

- ✓ If the product or waste is being shipped off-site and considered a hazardous material, meet the [US DOT hazardous materials transportation requirements](#). For more transportation information, contact the Michigan State Police [Traffic Safety Division](#) at 517-336-6580 or US DOT at 800-467-4922.
- ✓ Determine if the removed material can be used as is without any filtering or other processing. If so, the material is not a waste if it is managed as a product. Links to several material exchanges where you can post your product's availability is at www.michigan.gov/deqrecycling or contact the Environmental Assistance Center at 800-662-9278 if you need help finding someone to use your product.
 - Gasoline that is to be reused as a motor vehicle fuel would need to meet the Department of Agriculture (MDA) Laboratory Division requirements under [Regulation No. 564. Automotive Gasoline Purity, Additives, and Grading](#). Any facility (in all states, not just Michigan) that obtains hydrocarbon wastes or "unused" petroleum products and who will reintroduce the resultant mixture back into Michigan's gasoline supply system, is subject to regulation under the Motor Fuels Quality Act. The regulations still apply even if the end product has been "treated" or "reconditioned" in another state. Contact Celeste Bennett at 517-655-8202 ext 314 for more information on this MDA requirement.
- ✓ If the material is not a product, then determine if it is used oil, or a solid, hazardous or liquid industrial waste and meet the applicable requirements.
 - Oil that can not be used as is, and is not hazardous waste, would need to be managed under the used oil requirements summarized in the [Other Used Oil Generator Requirements](#) guidance.
 - Waste gasoline, diesel fuel, or other fuels are exempt from being a hazardous waste when sent to a fuel blender, or to a facility that will use it as a fuel like cement kiln or steel mill because it is still being used as a fuel [R 299.9202(1)(b)]. However, the material must be managed as [liquid industrial waste](#) and the shipment would need to be manifested and hauled by a permitted and registered transporter [324.12101(l)(v)].
 - Petroleum contaminated soil, groundwater, or other debris generated as result of a leaking underground storage tank (UST) is exempt from certain hazardous waste regulations. The exemption applies only if the contamination is due to the presence of benzene, or other D019-D043 toxic constituents [R299.9217], and the site is being cleaned up under the leaking UST requirements. The exemption does not apply to the contents in an UST, or from contamination resulting from overfilling an UST or AST [R299.9204(2)]. However, the facility must manage the liquids and sludge as [liquid industrial waste](#) [324.12101(l)].

The facility must keep waste characterization documentation for at least 3 years from the date of the last waste shipment. Discuss the detailed requirements about these exemptions or exclusions with your consultant or [Waste and Hazardous Materials Division District Office](#).

- ☒ Failing to characterize and properly manage waste removed from containers are common violations, especially when gas station tanks are emptied and several hundred gallons of flammable (D001) and/or benzene (D018) hazardous wastes are shipped off-site.

If the removed material is characterized as solid waste, contact the waste disposal company for their requirements to accept the waste.

If the removed material is characterized as liquid industrial waste, meet the [Part 121 of Act 451](#) management requirements. Hire a permitted and registered transporter and meet shipping and manifesting requirements. See the [Liquid Industrial Waste Generator Requirements](#) guidance for more information.

If it is determined the removed material is a hazardous waste, the facility needs to determine if this additional amount of waste will affect a facility's hazardous waste generator status and which regulations they will need to meet. The generator status is based on the amount of hazardous waste generated in a calendar month and how much is accumulated on-site. See the following summary table and linked guidance and inspection forms for more information. Cleaning out tanks may also affect the [annual user charge](#) the facility must pay if it increases the generator status. The facility must meet the applicable [Part 111 of Act 451](#) and federal [Resource Conservation and Recovery Act \(RCRA\)](#) generator requirements such as:

- ◆ Labeling containers
- ◆ Inspecting containers
- ◆ Being prepared for emergencies, meeting emergency planning and employee training requirements
- ◆ Having secondary containment when required
- ◆ Obtaining site identification number if the facility doesn't have one, or updating the notification information on file with WHMD if the regulated activities had changed. See the information about submitting the site identification form EQP5150 at www.deq.state.mi.us/wdspj.
- ◆ Meeting shipping requirements including hiring permitted and registered transporters, manifesting, submitting land disposal restrictions (LDRs), keeping and submitting records, etc.
- ◆ Meeting other record keeping and reporting regulations, including the biennial hazardous waste report required for large quantity generators.

SUMMARY OF HAZARDOUS WASTE GENERATOR STATUS CATEGORIES					
	Amount of non-acute hazardous waste generated in the calendar month	Approximate volume of non-acute hazardous waste ¹	Amount of acute or severely toxic hazardous waste generated per calendar month ²	Maximum amount of non-acute hazardous waste that can be accumulated on-site	Maximum time period before waste must be shipped
Conditionally Exempt Small Quantity Generator (CESQG) ³	Less than 100 kilograms (220 pounds)	Less than half of a 55-gallon drum, or 25 gallons ¹	Less than 1 kilogram (2.2 pounds) ²	1,000 kilograms (2,200 pounds)	No time limit unless amount exceeds 2,200 pounds
Small Quantity Generator (SQG) ³	At least 100 kilograms (220 pounds) but less than 1,000 kilograms (2,200 pounds)	One-half to five drums, or 25 to 250 gallons ¹	Less than 1 kilogram (2.2 pounds) ²	6,000 kilograms (13,200 pounds)	180 days, unless shipping over 200 miles, then 270 days
Large Quantity Generator (LQG) See the inspector checklists	1,000 kilograms (2,200 pounds) or more	Five full drums, or 200-250 gallons ¹	1 kilogram (2.2 pounds) or more ²	No maximum amount	90 days
¹ The liquid volume is only given as an estimate and is based on the waste having approximately the same weight and volume equal to water. Your liquid hazardous waste might have a different volume based on its weight. The regulations state amounts by weight.					
² Acute hazardous wastes are those in the "P" list and certain wastes in other lists indicated with an (H) and some "F" listed wastes; severely toxic wastes are those with an "S" in their number.					
³ If you are registered at one generator status but have a monthly hazardous waste shipment larger than the quantities allowed for that status, you will need to update your generator status by renotifying WHMD using the form EQP5150.					

DISPOSAL OF EMPTY TANKS AND CONTAINERS

Tanks and containers must be emptied of contents and sludges prior to disposal or recycling, and cleaned to a vapor free condition. Discuss the specific handling requirements with the disposal or recycling company. You may be required to cut up or crush the tanks or containers before they will accept it. Call the MIOSHA Consultation, Education, and Training Division at 517-322-1809 to discuss safety and health standards. Containers holding non-acute hazardous waste and liquid industrial waste are considered empty when the container or inner lining that held the waste has had as much material removed as possible (by practices commonly used to remove that material such as pouring, pumping, and aspirating), AND the amount of waste residue remaining in the container is any of the following:

- One inch or less; OR
- No more than three percent by weight of the total capacity for containers 110 gallons or less in size; OR
- No more than 0.3 percent by weight of the total capacity for containers over 110 gallons.

Containers that held acutely or severely toxic hazardous waste are empty when triple rinsed using a material capable of removing the product or by another proven cleaning method, or the inner lining that prevented contact of the chemical with the container has been removed from the container.

Containers that held compressed gas that is hazardous waste is empty when the pressure in the container approaches atmospheric.

The [U.S. Department of Transportation \(DOT\) regulations](#) define empty differently than the waste regulations. If the container held a DOT hazardous material and it will be transported over public roads, see 49 CFR Part 173.29 for definition of empty containers under transportation regulations. Contact the Michigan State Police [Traffic Safety Division](#) at 517-336-6580 or US DOT at 800-467-4922 if you have transportation questions.

PLASTIC: Recycle if possible, but plastic recyclers do not normally accept plastic fuel tanks or containers. For other containers, search for recyclers in the [Recycled Materials Market Directory](#) Plastic Category. For disposal, check with the waste disposal company if they will accept and how they must be prepared.

METAL: Recycle if possible. Look in the yellow pages under Scrap Metal for local salvage yards or search [Recycled Materials Market Directory](#) Metal Category for recyclers. Or contact the landfill authority to find out if they will accept for disposal and how they must be prepared.

EMPTY PROPANE OR COMPRESSED GAS PORTABLE TANKS:

The DEQ does not have a statewide listing of places that accept unwanted propane or compressed gas portable tanks that may be used for plumbing or with cutting torches, welding equipment, or used with portable camp stoves and lanterns and other tools. The one pound tanks are not refillable. Larger propane tanks have to have an [overfill protection device \(OPD\)](#) or they can not be refilled. If the knob on the tank is round, then the tank doesn't have the device. If the knob is triangular, it has the device.

- Some members of the Michigan Propane Gas Association (MPGA) accept empty containers from customers. Member locations can be found at www.usemichiganpropane.com or call the MPGA office at 517-487-2021.
- Another option is to check with local retail stores that sell or refill tanks and see if they will accept, or find out what companies take their unwanted tanks and then contact that company to see if they would accept your tanks.
- Check with the compressed gas dealers or salvage yards (see scrap metal in yellow pages for locations) to see if they will accept unfillable or unwanted tanks. Some scrap yards will accept if the whole valve top is removed because they do not want an explosion in the shredder if the tank still contained gas.
- You can also search the Internet for commercial companies that handle empty propane tanks.
- If these options are not available and the tank is empty, check with your trash hauler and landfill regarding if they will accept them.

This document was developed in February 2008 by the MDEQ Environmental Science and Services and Waste and Hazardous Materials Divisions. Regulations are subject to change.

The Michigan Department of Environmental Quality (MDEQ) will not discriminate against any individual or group on the basis of race, sex, religion, age, national origin, color, marital status, disability, or political beliefs. Questions or concerns should be directed to the MDEQ Office of Human Resources, PO Box 30473, Lansing, MI 48909.